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AUTHOR Lopez-Valadez, Jeanne
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ABSTRACT

With the decline of manufacturing, industry faces the layoff of many low-skilled workers and a shortage of skilled workers. To fill the gap, workers will need more skills, often those not taught in schools. Language minority individuals are most affected by these changes. The situation has brought a new political focus on the role of vocational education in the overall educational system. Proponents of vocational education see it as an alternative to the academic-only program; it provides a transition to careers for the non-college bound, and a stepping stone for those seeking higher education. The level of participation of limited-English-proficient (LEP) students in vocational education programs is difficult to determine, but a steady increase is suggested. LEP enrollments are skewed toward business, trade, and industry. Federal legislation attempts to provide accessibility, quality, and coordination of vocational education for this population. Currently, model programs in the Chicago Public Schools and at Florida's Miami Jackson Senior High School are addressing the specific needs of LEP students. The development of Vocational English-as-a-Second-Language (VESL) courses parallels these efforts. Educators, parents, and policymakers can all contribute to improving educational and employment preparation and services to LEP youth. (MSE)

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Training Limited English Proficient Students for the Workplace: Trends in Vocational Education

Jeanne Lopez-Valadez

Introduction

Employers in the U.S. are anticipating a major labor shortage as a result of the aging of the existing workforce and the slow growth of the population over the next two decades and possibly beyond. Consequently, business must reach largely underemployed segments of the population -- women and minorities -- for its new pool of labor. Demographers estimate that 5 out of 6 entrants into the labor force in the next decade will be racial minorities, immigrants, and women. Immigrants alone will account for 22% of all new workers, up from 7% in 1985 (Johnston and Packer, 1987). However, these new workers must be ready to enter an economy and a workplace that are rapidly changing. First of all, the economy is shifting from manufacturing and goods-producing to service industries (Johnston and Packer, 1987). A second major element affecting the workplace is the advent of technology and other scientific advancements. Although some workers are being displaced by technology, more skilled, higher wage jobs are being created as a by-product. For most workers, technology has simply meant acquiring new skills to facilitate the performance of tasks.

Industry has found itself in a strange predicament as a consequence of the decline of manufacturing. On the one hand, it has had to lay off many low skilled workers, while on the other, it experiences shortages of skilled workers (Leehy, 1988; Pressley & Denek, 1988). To fill these job affected by technology, workers will need higher skills. According to the Bureau of Labor, more than one half of all new jobs created in the next decade will require some education beyond high school. College graduates will fill almost a third of these jobs, up from 22% today for all occupations. Conversely, only 27% of all new jobs will fall into low skill categories (Johnston and Packer, 1987).

Employers are asking that all workers be better prepared and possess the following skills:

- broader, more functional basic skills (i.e., reading, writing, communicating, and computing for purposes of training and performing work-related tasks),
- computer literacy,
- problem solving and planning skills, and
- good work habits (e.g., punctuality, honesty, and dependability).

However, the skills, behaviors, and attitudes needed by workers are different from those taught in schools (U.S. Depts. of Labor, Education, and Commerce, 1988). It is not surprising that workplace research indicates a growing discrepancy between the preparation of the workforce and the changing demands of the labor market.

Language minority persons, including immigrants, are most affected by the changes in the labor market in which the fastest growing jobs will require the highest education and skill levels. In the 1980 Census, only 21% of limited English proficient (LEP) adults 25 years old and older were high school graduates compared to 69% of persons who spoke only English. Given the high dropout rate among language minority students, the future seems just as bleak. A study found that while the dropout rate for all students in 1976 was 11%, linguistic minorities had a rate of 18%, 40% for those that were LEP (Steinberg et al, 1984).

The widening gap between the skills needed in the workforce and what students are taught in school has brought with it a new political focus on education. A debate has ensued over educational reform and the role of vocational education, particularly at the secondary level (Galambos, 1984; Oakes, 1986; National Coalition

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of Advocates for Students, 1985; National Commission on Secondary Vocational Education, 1985; Kadamus & Daggett, 1986; Spence, 1986).

Education's primary response to the call for reform in education has been to strengthen the academic curriculum and raise high school graduation requirements. Consequently, opportunities to participate in elective offerings such as vocational courses have been greatly reduced, especially for the LEP students whose course load already includes numerous elective hours for English as a Second Language (ESL) and remedial instruction. The assumption seems to be that a college education is the only way to guarantee economic and career success. The authors of *The Forgotten Half: Pathways to Success for America's Youth and Young Families* (1988) not only dispute this, but point out that 20 million young people between the ages of 16 and 24 are not planning to go to college.

Proponents of vocational education see it as an alternative to the academic-only program that provides a transition to careers for the non-college bound and a steppingstone for those seeking higher education. They also promote its value as a key motivational factor in dropout prevention programs. Opponents, on the other hand, view vocational education as a dumping ground for large numbers of minorities and low-income students. They state that most vocational programs are outdated, particularly in predominantly minority communities, and only prepare students for low-paying, routine jobs. This paper will examine the effects of vocational education on language minority students at the secondary level. It will also present some promising practices in vocational education for LEP students. The paper will conclude with recommendations for bilingual and ESL educators, parents, and policymakers.

Vocational Education

Vocational education can be defined as that portion of the curriculum which prepares students for gainful employment in occupations requiring less than a baccalaureate or advanced degree. Vocational education spans occupations ranging from low-skilled to sophisticated jobs in technical fields. Generally, occupations are clustered into six training areas: business, health, home economics, agriculture, industrial/technical, and distributive/marketing. Also, some school systems are now grouping computer-related occupations as a new vocational cluster area.

Historically, vocational education has had multiple goals: meeting the demand for workers by providing job-specific training; increasing student options

through career exploration; and enhancing basic skills development through applied learning (Evans and Herr, 1978). A study of contemporary vocational education by Pratzner and Russell (1983) found that at the secondary level, the goal is primarily educational and exploratory in nature, while at the post-secondary level the focus is on specialized job skills development.

LEP Student Participation in Vocational Education

The participation of LEP students in vocational education is difficult to determine due to the lack of valid statistical information and the inconsistent use of the term limited English proficient. The current definition of limited English proficiency in the Vocational Education Act is the same as that used by the Bilingual Education Act (Title VII). Many states also stipulate that LEP students demonstrate "sufficient difficulty in speaking, reading, writing or understanding the English language as to deny such individuals the opportunity to learn successfully in classrooms where the language of instruction is English or to participate fully in our society" (Illinois State Board of Education, 1987).

Patterns are emerging from the available figures which indicate a steady increase in the number of LEP students participating in vocational education. The U.S. Department of Education, Office of Vocational and Adult Education (1983), reported that LEP persons comprised 1.0% of all vocational enrollments in FY 81, double the figure in FY 78. The 1984 Vocational Education Civil Rights Survey projected that LEP students make up 1.3% of the total vocational enrollments in comprehensive high schools, that is, 131,101 LEP students out of a total of 9,237,701. (U.S. Dept. of Education, 1986). Enrollment of LEP students at area vocational centers were even lower. So, although gains are being made, the LEP population is still under-represented in vocational education.

LEP students take vocational courses for different reasons. When LEP youth and adults at various sites were asked why they enrolled in their particular vocational programs, Friedenberg (1987) found:

- 63% like the trade/area and want to work in it,
- 23% want to use it to gain more training,
- 8% need the money, and training will help get a job,
- 5% want to improve their English in a trade they know, and
- 4% want to learn more about an area they have experience in.

Students who saw vocational education as a stepping stone gave examples such as how typing would lead to business administration or electronics to electrical engineering.

As with other vocational students, LEP enrollments are skewed toward two occupational areas -- business (47%) and trade and industry (41%). Most of the men are in the latter while most of the women are in the former. Interestingly, Asian women are three times more likely to be in trade and industry programs than are white women. When one looks at the percent of LEP students in given occupations, they are least represented in health occupations but most represented in home economics (Campbell et al, 1986).

Legislative Context

Vocational education legislation began addressing the issues of equal access with the enactment of the Vocational Education Act of 1963. However, it has only been since the Vocational Education Amendments of 1976 that LEP persons have been targeted financially through the disadvantaged set-asides and the national demonstration program for Bilingual Vocational Training, which funds projects for training adults, staff development, research, and curriculum development. The current legislation, the Carl Perkins Vocational Education Act of 1984, sets as one of its primary purposes to assure LEP persons access to quality vocational programs. Three themes permeate the Act: accessibility, quality, and coordination (Lopez-Valadez and Friedenberg, 1987).

The Act explicitly states that LEP persons are to be actively sought and given the opportunity to enroll in any occupational area and type of vocational program, including occupational-specific courses, cooperative education, and apprenticeship training. Moreover, by targeting LEP individuals in each part of the Act, Congress clearly intended that vocational educators serve both youth and adults, as well as special segments of the LEP population such as the disabled, single parents, criminal offenders, and dislocated workers.

The Perkins Act prescribes the services LEP students and other individuals with special needs are to receive from vocational programs. As part of access, the law requires that each local education agency provide information to LEP students and their parents regarding vocational opportunities and eligibility criteria prior to the ninth grade. Additionally, all LEP students enrolled in vocational education must receive:

- guidance, counseling, and career development activities by professionally trained counselors;
- an assessment of their vocational interests, abilities, and special needs;
- special services to insure full participation including adaptation of curriculum, instruction, equipment, and facilities; and
- counseling services designed to facilitate the transition from school to post-secondary employment and career opportunities.

The Act emphasizes supporting students to help them succeed in mainstream programs even though separate programs are allowable and partially fundable.

The Office of Civil Rights' Title VI publication, "Guidelines for Vocational Education Programs," states that schools cannot deny LEP students admission to vocational education solely on the basis of limited English language skills. It also calls for the dissemination of information in the native language of the community, seeks to ensure that programs are located in areas accessible to the community, and requires bilingual counselors or translators for counseling services. It also holds each school responsible for ensuring that it does not enter into any agreement with a union or employer for apprenticeship training, work-study programs, or job placement if they discriminate on the basis of race, color, national origin, sex, or handicap.

Program quality is the second major emphasis of the Perkins Act. The Act supplies five mechanisms for quality control: 1) state-mandated assessment of the labor market, 2) local program evaluation, 3) national research to identify effective methods, 4) pre- and in-service training of staff, and 5) funding for equipment and curriculum improvements.

Response to LEP Students

A study entitled *The Condition of Vocational Education for Limited English-Proficient Persons in Selected Areas of the United States* provides an in-depth examination of the impact of the vocational mandates on services to LEP persons (Friedenberg, 1987). Twenty-seven secondary and adult vocational programs in seven states were studied, and the report states that:

- The comprehensive high schools did not actively recruit for their vocational programs. These high schools relied on counselors to inform students, but interviews revealed a strong bias by these staff

members against vocational education and the placement of LEP students in training programs.

- Assessment practices varied extensively, but only a few programs used special instruments or conducted interviews in the students' native language; more than a third relied on standardized achievement tests to measure the English proficiency of LEP students. Many of the programs used the results to screen out students rather than provide remediation.
- Efforts to adapt vocational instruction for LEP students ranged from non-existent to extensive. In general, adaptation was dependent on staff attitudes and available bilingual personnel. One third of the schools used bilingual aides; most relied on informal peer tutoring and volunteer student translators, even at sites with extensive Title VII bilingual programs.
- Many vocational programs used bilingual teacher aides to recruit, teach, and counsel LEP students. Yet these paraprofessionals received minimum wage, worked part-time, and were given little or no training.
- Many comprehensive high schools offered content area instruction or general English classes under the guise of ESL. ESL classes given to vocational students would be considered general purpose with a focus on interpersonal communication or academic language.

The Office of Civil Rights, U.S. Dept. of Education (1986), also found that 25% of LEP vocational students in comprehensive high schools and 50% of those in area vocational centers were not enrolled in any program designed to improve their English language skills.

Program Models

One local education agency which has successfully turned the Carl Perkins mandates into practical application is the Chicago Public Schools through its Bureau of Vocational Support Services within the Department of Vocational and Technological Education. The Bureau's mission is to provide support services to enable special needs students (those students who are LEP, handicapped, or at-risk of dropping out) to successfully participate in vocational education and to transition into post-secondary vocational training programs or employment. A team of professionals in each of seven related components coordinates support services to these vocational students in 54 high schools throughout the city. The components are the following:

Vocational Assessment: provides comprehensive, vocational student testing (ability, aptitude, interest, achievement).

Vocational Education for the Handicapped: coordinates instructional supports for the disabled.

Vocational Articulation for Special Education Students: assists severely disabled students in the transition to competitive employment.

Vocational education for the Limited-English Proficient: coordinates instructional supports for LEP students.

Student Services Corporation: oversees the peer tutor program.

Vocational/Academic Resource Center: oversees computer labs providing remedial instruction in vocational related math, language, and reading.

Vocational Articulation/Post-Secondary Career Options: assists graduating seniors with the transition to post-secondary placements.

The LEP component has established full-service programs at 16 high schools serving a linguistically diverse student population. At each site, a bilingual vocational resource specialist (a local teacher working on an extended workday) recruits, coordinates services, and monitors the LEP students' progress. To reach both parents and students, the staff conduct presentations at bilingual parent advisory council meetings and special career nights as well as participate in parent interview days at feeder schools to help program students. Brochures about the various career programs have been translated and posters placed throughout the schools urging students to explore vocational options.

Helping students make appropriate choices is one of the main purposes of the assessment and counseling components. As in most schools, all eighth graders are administered a career interest test. A non-verbal instrument, the Pictorial Inventory of Careers, is used with LEP students. In several schools, eighth graders are also given the opportunity to gain some career awareness through a hands-on program called Choice. Students are released from their bilingual class and sent to a vocational classroom to explore jobs through simulations at work stations. Disabled LEP students may be referred to one of the vocational assessment sites for further diagnosis with the help of bilingual instruments or bilingual vocational aides.

Once enrolled in vocational classes, LEP students are provided individualized assistance by bilingual peer and college tutors who have had vocational training. Tutors meet with students during study hall, lunch time, or in class to translate instruction, review lessons or homework, teach vocabulary, and help prepare for tests. Along with the tutors, bilingual vocational aides are available to assist in and out of class. Vocational/academic resource centers (computer labs) and special resource materials are additional tools for helping LEP students succeed in their vocational programs.

All resource persons are paid (including the peer tutors who are also disadvantaged students) and receive inservice training. One goal of the Bureau is to create a career path for the tutors and aides, so that some will become vocational teachers (Azcoitia and Viso, 1987).

College tutors serve another important function as role models, and LEP vocational students are encouraged to pursue post-secondary education and training. Visits by representatives of colleges and vocational skills centers and field trips for students are planned. The bureau arranges for support services at post-secondary institutions that will "help students enter and thrive in the programs." (Azcoitia and Viso, 1987).

A new program at Miami Jackson Senior High in Florida takes a more integrated approach to service delivery. The Bilingual Vocational Instructional Program (BVIP) is a joint project of the departments of Dropout Prevention, Bilingual Education, and Vocational Education for the Dade County Public Schools. Its goal is to reduce the dropout rate for LEP students by enabling them to achieve success in school and providing the necessary support services to meet their non-academic needs. It is hoped that LEP students will increase their earning potential, build a positive attitude, and improve their English proficiency.

Hispanic and Haitian high school students identified as at-risk and LEP are recruited from the bilingual program at the school. As in the Chicago program, translated flyers about the program are disseminated. A counselor assigned to the LEP students screens the prospective students and develops their individualized plans of study, which are updated annually.

Once enrolled in one of eight occupational programs, students receive individual and small-group tutoring 3 to 4 hours/week, using a pull-out model. The tutoring sessions focus on the students' specific problems with content or language in their vocational classes. Students are grouped by occupational area to receive vocational

English as a Second Language instruction at least one session a week. Other small group tutorials teach study skills and job-seeking skills needed by all students. Bilingual project staff or peer tutors conduct the sessions. Bilingual teacher aides also assist with the translation of materials such as class rules, essential vocabulary, and tests and are available "on call" to respond to requests made by LEP students or their vocational teachers for in-class translating. Given the small staff, this service is on a "first come" basis. The school provides the peer tutors elective credit hours in lieu of pay.

The LEP vocational students are concurrently enrolled in a bilingual program where they are grouped by proficiency level and receive ESL instruction and bilingual content area instruction in self-contained LEP classes. The BVIP staff meets regularly with the bilingual program staff to share lesson plans and monitor student progress. The bilingual program can then address the basic skills which are particularly problematic to the LEP students in their vocational classes.

As in many other programs that work with at-risk youth, the staff's responsibilities are not limited to instructional support. BVIP staff members help counsel students and make referrals. If students are absent several times, staff members visit their homes to talk to parents or other responsible adults. The school has also instituted the "Teacher as Advisor Program," where each homeroom teacher is assigned a group of students to advise until graduation. Although students are encouraged to pursue post-secondary education, computerized job information and referral to the local private industry council (PIC) for job placement or subsidized training are also available.

Both of the previously described models use a mainstream, transitional approach to vocational training for LEP students. The third program, an enrichment model, uses many of the same intervention strategies but seeks to prepare students both linguistically and vocationally for occupations in which bilingualism is an asset. One such program is the bilingual secretarial program offered by the Essex County Vocational Technical Schools in Newark, New Jersey. The North 13th Street Center, where the program is located, is an open admissions vocational school which recruits its students from the area's feeder schools. Special efforts are made to attract LEP students, including announcements on Spanish radio stations, letters to counselors, and slide presentations to eighth graders. LEP students can choose from a wide range of vocational programs. Spanish speakers can also select

one of the bilingual programs -- bilingual secretarial or bilingual cosmetology.

LEP students send their applications to the Bilingual/ESL Program Coordinator who oversees services for this population. Students who have applied to a regular program but may be LEP as determined by screening of applications, interview, and/or testing are referred internally to the bilingual counselor. "The district places tremendous emphasis on proper identification and placement of the LEP student and equal emphasis on their appropriate exit and transition from the program. The program is designed to ensure that LEP students obtain proficiency in English as quickly as possible so that they can participate effectively in the regular educational program" (Essex County Vocational Technical Schools, no date). Parental involvement in this process is also highly valued. Parents are notified of the process, involved in the intake and assessment interview, and invited to a special orientation session for LEP students and parents and parent conferences to give input into their child's Individual Student Improvement Plan (ISIP).

The design of the bilingual secretarial program is comprehensive, allowing students to pursue a four-year vocational and academic sequence that enables them to graduate and acquire employability skills. It provides bilingually taught vocational skills training, structured English language instruction, bilingual support services for the content areas, job development and job placement, and follow-up services. The bilingual secretarial instructors integrate the teaching of Spanish into the vocational course. Stenography in Spanish and bilingual business correspondence classes are also offered.

The beginning vocational courses are special LEP sections; more advanced courses are mainstream classes. If a bilingual vocational teacher is unavailable, bilingual aides assist in class. Bilingual resource teachers help by creating materials or tutoring.

Students, grouped by English proficiency level, receive daily ESL instruction. The classes are a combination of general purpose ESL and vocational ESL (VESL), which teaches the language content and skills to survive in a vocational classroom and on the job. Since students from various vocational areas are in the same class, the approach is not occupational specific VESL.

VESL Program Development

As can be seen from these programs, bilingual supports for the vocational area are extensive, yet the development of VESL is quite limited. Secondary

schools generally maintain their grammar approach to general purpose ESL while integrating the teaching of vocation-specific vocabulary and job seeking language related to interviews and job applications. Some high schools have set up special ESL classes that teach pre-employment ESL or career awareness through in-school shadowing experiences.

Paralleling the developments in vocational education are those in VESL for adults. In contrast to most general purpose ESL programs, VESL typically uses a functional approach in which key language is derived from the tasks or competencies necessary to perform in the workplace. Refugee programs, such as the Work English Project in Illinois, have designed a general employability ESL curriculum to teach the competencies new job seekers in entry level positions would need. Participants in these programs were then placed in jobs without skills training. Bilingual vocational training programs, on the other hand, offer vocational training concurrent with VESL instruction. In these programs, VESL competencies are derived from tasks performed in a specific job, such as data entry operator, nurses aide, or auto mechanic. Thus, the proficiency level required, the language skills stressed, and the vocabulary taught differ from job to job. The scope and sequence of the job-specific VESL course depend not only on the vocational course content but also on its methodology. Project OSCAER, a federally funded bilingual vocational materials project, found that even in job-specific VESL, a core of language competencies were covered including the following:

Identification: understand, read, or state the names of tools, supplies, and equipment;

Function and Process: understand and describe job processes and procedures;

Task Performance: follow oral or written instructions, report on work, request assistance, and complete work related forms;

Clarification and Verification: express understanding or lack of understanding;

Safety: respond to warnings and warn others, report accidents or hazardous conditions, and read safety signs or labels; and

General Employment: read and inquire about job openings, ask and respond to interview questions, read and complete employment related forms, report tardiness or absences, and request raises (1987).

Because of entrance requirements and the limited number of LEP students in any one occupational train-

ing area, VESL instructors have turned to teaching general language skills within an occupational cluster. One example of cluster VESL is the VESL for Industrial and Technical Training (VITT) curriculum, which uses basic concepts from the industrial technical fields to develop concept applied language proficiency. The VITT curriculum is organized around rhetorical functions, allowing students to learn not only labels but patterns of thinking to classify, compare, contrast, and sequence. VITT was designed as a transitional course to prepare LEP students to enter mainstream vocational programs, therefore, great attention is paid to listening for lectures, reading of technical materials, and study skills such as note-taking and test taking.

Effects of Vocational Education

The validity of any program is determined largely by its outcomes. For vocational education, evaluation has focused on the educational attainment and labor market success of its students. Unfortunately, information on the impact of vocational education on LEP students is minimal given the data limitations, and only tentative conclusions can be drawn by examining statistics on Hispanics and other language minority groups.

Educational Attainment:

- Although vocational education has been viewed as a dumping ground for students with low academic achievement, data from the National Longitudinal Study of the Class of 1980 indicate that vocational students scored only slightly lower on standardized tests than those pursuing a general curriculum (Galambos, 1984).
- While dropout rates are lowest for college preparatory students (6%), those for vocational and general curriculum students are 16% and 21% respectively.
- The dropout rate for vocational students decreases in the upper grades when occupational specific courses are offered, while the rate for general program students increases (Dronka, 1988). Vocational education's role in student retention appears particularly successful when coupled with other critical components of a dropout prevention program (Weber and Mertens, 1987; Azcoitia & Viso, 1987; Holmes & Collins, 1988).
- Ability, socio-economic status, and tenth grade GPA are strong predictors of post-secondary schooling. Higher levels self-esteem are also as-

sociated with higher levels of schooling. Again, controlling for other factors, vocational education graduates are no less likely to pursue post-secondary education than general program graduates (Campbell et al, 1986).

- While the rate of all students pursuing some form of post-secondary education has not changed much in a decade, the proportion of vocational students has increased from 17% in 1972 to 24.6% in 1980. The increase was greatest among students who had taken many vocational courses in high school (Dronka, 1988).
- The most common type of post-secondary school for high school vocational graduates is the 4-year college or university (Campbell et al, 1986).
- Although high school vocational graduates are more likely than those from the general curriculum to enter vocational-technical schools, Hispanics and LEP vocational graduates tend to enroll in 2 or 4 year schools more often than in vocational-technical schools (Campbell et al, 1986).

Labor Market Success:

- Labor force participation appears to be more continuous for secondary vocational graduates than other graduates, although for women and LEP students it is lower (Campbell et al, 1986).
- Secondary vocational education provides an advantage in earnings for graduates employed in jobs related to their training. However, less than half of all vocational graduates are in training-related employment.
- When controlling for other factors, high school curriculum selection makes no difference with respect to earnings for Hispanics; wages are determined by the extent of post-secondary education. Hispanic university graduates make 36% more than Hispanic high school graduates, almost double the difference between non-Hispanic high school and university graduates.

Summary

The dramatic changes in the workplace brought about by shifts in the economy and scientific innovations will require a better educated, more adaptable workforce. Yet the needs of employers are colliding with an increasingly ill-prepared workforce. Educational reform

has sought to address this mismatch by strengthening the academic curriculum and raising graduation requirements. Although a third of the jobs in the next decade will require a college degree, for the remaining two-thirds rudimentary economic and technological concepts, functional basic skills, and reasoning ability will be more important to long term employment.

Vocational education has served as an alternative path to career opportunities, but its difficulty in meeting the same educational and labor market outcomes as the academic curriculum has brought it under scrutiny. Consequently, there is a current effort to revitalize and redefine vocational education, particularly at the secondary level. This has resulted in a debate as to whether to emphasize job-specific skills or broader concepts and basic skills to ensure ongoing employability.

Given the increased importance of minorities in the workforce, accessibility for special populations such as LEP persons is another major policy concern. Although recent legislative mandates and targeted funding have increased vocational opportunities for LEP students, they remain under-represented and under-served. There are, however, model vocational programs that point to successful practices that not only promote full LEP participation but also help with dropout prevention and transition to postsecondary education or employment. In each of these programs, a staff member is specifically assigned to coordinate comprehensive support services which include bilingual assistance and VESL instruction.

Recommendations

If LEP students are to develop the knowledge and skills needed to compete in the workplace, then educators, parents, and policymakers must insure accessibility to quality educational opportunities. Educators can improve the educational preparation of LEP youth by implementing the following recommendations:

- increasing students' awareness of career options and available programs;
- improving language instruction through concurrent or transitional VESL;
- reducing language barriers to training by providing bilingual support and staff development in sheltered English and cross-cultural awareness;
- establishing coordination between bilingual and vocational programs; and

- teaching cooperative learning, problem-solving, and thinking skills.

Parents can take an active role in employment preparation by following these recommendations:

- advocating quality programs for their children;
- assisting with the development of career plans; and
- participating in the design and evaluation of training programs.

Policymakers can promote services to the LEP by following these recommendations:

- expanding research on LEP students;
- targeting funding for employment-related programs for LEP students;
- promoting the recruitment and training of bilingual/bicultural educators; and
- fostering cooperation among academic, bilingual, and vocational programs, and between secondary and postsecondary programs.

With the reauthorization of vocational education legislation imminent, it is also crucial that LEP advocates, educators, and parents become actively involved in redefining vocational education at the national level.

Conclusion

The demographics and the shift to a service-based economy present a unique opportunity for linguistic minorities to improve their employment outlook. Not only is the private sector in need of young workers, but many new jobs in the health, retail, and education fields are particularly suited to bilingual persons. However, unless LEP youth are better prepared, they will end up competing for a dwindling number of low skill, low paying jobs while higher skill positions remain unfilled. This will further reduce this population's economic well-being and jeopardize our country's ability to compete globally.

REFERENCES

- Azcoitia, C. & Viso, P.A. (1987). Dropout prevention Chicago style. *Vocational Education Journal*, 62(2), 33-34.
- Campbell, P.B., Basinger, K.S., Dauner, M.B., & Parks, M.A. (1986). *Outcomes of vocational education for women, minorities, the handicapped, and the poor*. Columbus, OH: The National Center for Research in Vocational Education, Ohio State University.
- Dronka, P. (1988). A review of the second interim report from the National Assessment of Vocational Education. *Vocational Education Journal*, 63(8), 16-17.
- Essex County Vocational Technical Schools. (no date). *Quality you can see! A transitional bilingual vocational training program at the secondary level*. East Orange, NJ: Essex County Vocational Technical Schools.
- Evans, R. & Herr, E. (1978). *Foundations of vocational education*. Columbus, OH: Charles E. Merrill Publishing Company.
- Friedenberg, J.E. (1987). *The condition of vocational education for limited English-proficient persons in selected areas of the United States*. Columbus, OH: National Center for Research in Vocational Education.
- Galambos, E.C. (1984). *Issues in vocational education*. Atlanta: Southern Regional Education Board.
- Holmes, M.B.W. & Collins, A.E. (1988). Retaining potential dropouts. *Vocational Education Journal*, 63(1), 22-24.
- Illinois State Board of Education. (1987). *Serving handicapped, disadvantaged, and limited-English-proficient persons in vocational education programs*. Springfield, IL: Dept. of Adult, Vocational, and Technical Education.
- Johnston, W.B. & Packer, A.M. (1987). *Workforce 2000: Work and workers for the twenty-first century*. Indianapolis, IN: Hudson Institute, Inc.
- Kadamus, J.A. & Daggett, W.R. (1986). *New directions for vocational education at the secondary level*. Information Series No. 311. Columbus, OH: ERIC Clearinghouse on Adult, Career, and Vocational Education, Ohio State University.
- Leehy, M. (1988). Wanted: Skilled industrial workers. *Vocational Education Journal*, 63(1), 43.
- Lopez-Valadez, J. & DeHesus, P. (1982). *Vocational programming for the LEP, Part 1: Common concerns and solutions*. Arlington Heights, IL: Northwest Educational Cooperative.
- Lopez-Valadez, J. & Friedenber, J.E. (1987). LEP students: A growing special population. *Vocational Education Journal*, 62(2), 27-29.
- National Coalition of Advocates for Students. (1985). *Barriers to excellence: Our children at risk*. Boston: National Coalition of Advocates for Students.
- National Commission on Secondary Vocational Education. (1985). *The unfinished agenda: The role of vocational education in the high school*. Columbus, OH: National Center for Research in Vocational Education, Ohio State University.
- Oakes, J. (1986). Beyond tinkering: Reconstructing vocational education. In G.H. Copa, et al, *An untold story: Purposes of vocational education in secondary schools*. St. Paul: Research and Development Center for Vocational Education, University of Minnesota.
- Parnell, D. (1985). *The neglected majority*. Washington, DC: Community College Press.
- Pratzner, F.C. & Russell, J.F. (1983). *The roles and functions of vocational education: Some current perspectives*. Columbus, OH: National Center for Vocational Education, Ohio State University.
- Pressley, L.L. & Denek, C. (1988). Finding people for essential work. *Vocational Education Journal*, 63(1), 44.
- Project OSCAER, Northwest Educational Cooperative. (1987). *VESL for heating and air conditioning: A competency-based curriculum guide*. Macomb, IL: Curriculum Publications Clearinghouse.
- Spence, D.S. (1986). Rethinking the role of vocational education. *Educational Horizons*, 65(1), 20-23.
- Steinberg, L., Lin Blinde, P., and Chan, K. (1984). Dropping out among language minority youth. *Review of Educational Research*, 54(1), 113-132.

U.S. Department of Commerce, Bureau of the Census. (1980). *Detailed population characteristics. United States summary section A: United States*. Washington, DC: Government Printing Office.

U.S. Department of Education. (1983). *Fact sheet on vocational education for persons limited in English proficiency*. Washington, DC: Office of Vocational and Adult Education.

U.S. Department of Education. (1986). *The 1984 vocational education civil rights survey*. Washington, DC: Office of Civil Rights.

U.S. Departments of Labor, Education, & Commerce. (1988). *Building a quality workforce*. Washington, DC: Office of Public Affairs, Employment and Training Administration, Department of Labor.

Weber, J.M. & Mertens, D.M. (1987). Vocational education's role in dropout prevention. *Vocational Education Journal*, 62(2), 46-48.

William T. Grant Foundation's Commission on Work, Family, & Citizenship. (1988). *The forgotten half: Pathways to success for America's youth and young families*. Washington, DC: William T. Grant Foundation.

About the Author

For the last 10 years, Jeanne Lopez-Valadez has been the director of technical assistance, curriculum development, and teacher training projects related to vocational education for LEP students at the Northwest Educational Cooperative in Des Plaines, Illinois. She has published extensively on bilingual vocational education and related topics.

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